

REMARKS

This is in response to the Office Action dated November 26, 2004.

First note that the specification is being amended at ¶[0079] to correct a minor typing error – “Inclined” to - -inclined--.

The Examiner rejected claim 30 as being obvious over Frederiksen in view of Herman et al and Mapp. Mapp is newly cited and thus has not been previously commented on by applicants.

Counsel for applicants respectfully disagrees with the reasons given for the rejection of claim 30 and points out in the comments below why the rejection should be withdrawn. However, on a minor formal matter, it should be noted that in ¶2 at page 2 of the Office Action the Examiner started the discussion of the basis for rejection with: “Regarding claim 1 ...”. It is obvious that this is a mere formal error and that the reference was intended to be to “claim 30” and not to “claim 1” which has been allowed.

Let us now look again to some of the elements as defined by claim 30.

A. Elements of Claim 30

First it should be noted that claim 30 is being amended to clarify some minor ambiguities as to the references to the “inclined ramp module” and the “other ramp module”.

The unique inclined ramp module as defined by claim 30 has “attachment means” with “at least one T-shaped protrusion integrally formed on said end wall of said inclined ramp module” and “at least one T-shaped channel groove integrally formed on said end wall of said inclined ramp module”. The end wall of the other ramp module has “attachment means” which are similarly constructed.

It should also be noted that claim 30 defines the inclined ramp module as being a hollow structure with the T-shaped protrusion having a generally hollow construction opening to the inside of the ramp while being closed at the top. The other ramp module is similarly constructed and defined.

It is clear that the T-shaped protrusions protrude outwardly from the end walls. It is also clear that the T-shaped protrusion on the end wall of the inclined module is adapted to be slidingly, matingly moved into the T-shaped channel groove on the end wall of the other module.

Such module structures for ramp assemblies for providing aerial, as defined above, are nowhere to be found in the prior art nor are such module structures suggested by the combination of any of the references.

Let us now look at the prior art relied upon by the Examiner in the Office Action and the analysis of these patents as noted in the Office Action.

A. Frederiksen (Primary Reference)

In Frederiksen the ramp 2 and tile element 4 are connected together end-to-end by separate coupling pieces 14 locatable in slots or cut-outs 12 in the end walls. The slots or cut-outs 12 are required to be in alignment in the adjacent end walls of the ramp 2 and tile element 4 for end-to-end connection by the separate coupling pieces 14. In the present invention the end-to-end connections are made by integrally formed T-shaped protrusions and T-shaped grooves which can be interconnected. But here the T-shaped protrusion on one module is not adapted to be in line with the T-shaped protrusion on the other module for end-to-end connection. The same is true for the T-shaped grooves. Rather, here the T-shaped protrusions are in line with the T-shaped

grooves for end-to-end connection. This facilitates assembly and disassembly and mobility of the system.

In this regard, it can be seen that the T-shaped protrusions and grooves facilitate securing the ramps together over a more evenly distributed area. Whereas Frederiksen provides securement over only a limited section of the slots or cut-outs 12 at the bottom of the modules.

The use by Frederiksen of T-shaped “protrusions” or outward projections for connection would create gaps with the thresholds to be crossed and thus is completely contrary to the teaching of Frederiksen. Clearly Frederiksen avoids gaps between the ramp elements and the threshold to be crossed. For example see the discussion at page 2, lines 27-30:

“With more lasting arrangements, such as in the home of the user, it will be undesirable for the formation of gaps to arise between the ramp elements and the edges of the thresholds as a consequence of the said customary floor lists,...”

Clearly integrally formed T-shaped protrusions in the end walls will result in gaps with the threshold and thus would not work with Frederiksen’s assembly of Figure 5 and certainly not that of Figure 6. Thus Frederiksen teaches away and completely negatively with regard to a ramp with an integral connecting structure that extends or projects outwardly from the end wall! Clearly, Frederiksen does not teach the use of T-shaped protrusions or the acceptability of such a connecting structure for a ramp.

B. Herman et al (Secondary Reference)

The Herman patent is directed to special ramp constructions for protection of cables, hoses, etc., extending across a street or a walk way. The modules are not hollow, one piece structures and are not open at the bottom. The straight module 10 is

designed with transverse channels or openings 34 through which cables, hoses, etc. can pass. The straight module includes a hinged upper cover plate to cover the channels and also to facilitate insertion of the cables, hoses, etc. On the other hand the inclined ramp 50 is apparently of a solid, one piece structure and thus is not hollow! It cannot be seen how the connector 54, at the end wall could in any way be hollow and be open to the inside of the inclined ramp 50 which is solid.

Clearly Herman is directed to a limited versatility of combinations – limited to cable, hose, etc. protection. There is not really an open hollow construction. Such hollow construction in the present invention facilitates manufacture and also provides modules of generally much lower weight than solid modules.

C. Mapp (Secondary Reference)

The Examiner, in the rejection of claim 30, relied upon the patent to Mapp in combination with Frederiksen and Herman. Here the Examiner started with the following comment noting certain teachings missing from Frederiksen, the Primary Reference:

“Frederiksen also fails to disclose the ramp module and T-shaped protrusions being hollow”. (Underlining Added).

This comment already is erroneous in implying that Frederiksen somehow shows a ramp structure with “T-shaped protrusions” which it clearly does not have. The separate coupling pieces 14 are not T-shaped protrusions!

Along this same line the Examiner further comments about Frederiksen's “T-shaped protrusions”:

“It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the ramp and protrusions of Frederiksen to be hollow as taught by Mapp...”. (Underlining Added).

This again is erroneous in indicating that Frederiksen shows protrusions which it clearly does not.

There is no disagreement that Mapp teaches a ramp with a hollow structure. However, the comment that Frederiksen teaches the use of "T-shaped protrusions" is clearly erroneous and as noted above the use of any such "protrusion" structure is clearly contrary to Frederiksen's teaching.

But now let us look further to Mapp. There is no doubt that Mapp does not teach a T-shaped protrusion or any protrusion extending outwardly from the side walls or end wall of the ramp. In this regard, however, it can be seen how the description in Mapp could have misled the Examiner.

Thus Mapp teaches ribs on the side walls and end wall. Side wall 13 has ribs 21, 23 and 25 while side wall 15 has ribs 33, 35 and 37. The end wall 17 has ribs 27, 29 and 31. It is clear that these elliptically shaped ribs are of a limited length and are provided solely to reinforce their respective side walls and end wall. Also, Mapp clearly notes that the ribs are inward depressions not outward projections. Thus Mapp at Col. 3, line 64 to Col. 4, line 15 states:

"As seen in the figures, each of the side walls 13, 15 and the rear wall 17 are integrally reinforced. Thus, the side wall 13 includes depressions 21, 23 and 25 that comprise reinforcing ribs strengthening the side wall 13. These depressions are best seen in FIGS. 1 and 3. With reference to FIG. 5, these depressions 21, 23, 25 extend completely through the material of the side wall 13 and, as seen in FIG. 5, are visible as protrusions with the same numbers being employed as are employed in FIGS. 1 and 3 since these are the same structures and FIG. 5 merely shows the other side of them. (Underlining Added).

Similarly, with reference to FIG. 4, the rear wall 17 includes reinforcements consisting of depressions 27, 29 and 31 which, as best seen in FIG. 5, extend completely through the material of the rear wall 17 and comprise protrusions identified with the same reference numerals as used in FIG. 4. The

reinforcing means for the side wall 15 are seen in FIG. 5 as the protrusions 33, 35 and 37 and their appearance on the outside of the wall 15 corresponds, symmetrically, to that of the wall 13 as seen in FIGS. 1 and 3". (Underlining Added).

The reinforcing depressions are also noted in the claims. For example claim 3 makes the following reference to the depressions, i.e. ribs:

"said integral reinforcement comprises a plurality of elongated depressions in each of said side walls and rear wall". (Underlining Added).

A similar reference is made in claim 13.

Mapp occasionally makes reference to the inwardly extending "depressions" as "projections" but only when viewed from the underside of the ramp. See Col. 2, lines 46-52:

"2. The inventive ramp includes side and rear walls with built-in reinforcements. The reinforcements consist of depressions in the outer walls thereof that are seen, in the underside, as projections. In other words, these depressions extend completely through the material and act as reinforcing ribs. In the preferred embodiment, three such depressions are formed in each of the side walls and the rear wall". (Underlining Added).

The underside view of the ramp in Fig. 5 shows the ribs, which when viewed from the bottom of the ramp are referred to as "projections". See Col. 3, line 64 to Col. 4, line 16. See also claims 4 and 14 which indicate that the depressions in the outer surface of the side walls and end wall appear as projections on the undersurface of the walls.

Thus it can be seen how the Examiner could have been misled by the reference to the ribs as protrusions or projections but only when viewed from the underside.

Clearly, however, Mapp's ribs or depressions cannot in any way be considered to be "attachment means" or in any way similar to or suggestive of the T-shaped protrusions of claim 30. In this regard, however, the T-shaped channel grooves of claim 30 could possibly be looked at as depressions but certainly not as projections unless, of

course, one views the ramps from the bottom side. But even here, Mapp's ribs or depressions cannot in any way be considered to be any form of "attachment means".


In view of the above it cannot be seen how the reinforcing ribs – depressions - of Mapp can in any way be considered to teach or even remotely suggest applicants' T-shaped protrusions. In fact it cannot be seen how Mapp's ribs in any way teach or suggest a connecting structure. Further, in this regard, the disclosure of the present invention also teaches the use of internal ribs to increase the strength of the ramps. Also, as previously noted, it would appear that the T-shaped protrusions and T-shaped channel grooves in the end wall, as defined by claim 30, would also provide some extra strength to the end wall.

In view, of the above, it is respectfully submitted that the combination of Mapp with Frederiksen and Herman in no way teaches or suggests the unique ramp structure as defined by claim 30.

In view of the fact that the application is currently under Final Rejection, the Examiner's careful attention to this matter would be greatly appreciated. In the event, the Examiner has any further questions or comments, the Examiner is respectfully requested to call counsel for applicants in order to expedite any further proceedings.

Once again the Examiner's careful reconsideration of this matter is requested.

Respectfully submitted,

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